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**Skinder et al.**(10) **Pub. No.: US 2014/0232570 A1**(43) **Pub. Date: Aug. 21, 2014**(54) **VEHICLE LOCATION IN WEAK LOCATION  
SIGNAL SCENARIOS**(52) **U.S. Cl.**CPC ..... **G08G 1/123** (2013.01)USPC ..... **340/989**(71) Applicant: **APPLE INC.**, Cupertino, CA (US)(72) Inventors: **Jason A. Skinder**, Cupertino, CA (US);  
**Stephen O. Lemay**, Palo Alto, CA (US);  
**Bradford A. Moore**, San Francisco, CA  
(US); **Seejo K. Pylappan**, Cupertino,  
CA (US); **Christopher Blumenberg**,  
San Francisco, CA (US); **Marcel van  
Os**, San Francisco, CA (US); **Devrim  
Varoglu**, Santa Clara, CA (US)

(57)

**ABSTRACT**

A mobile computing device can be used to locate a vehicle parking location in weak location signal scenarios (e.g., weak, unreliable, or unavailable GPS or other location technology). In particular, the mobile device can determine when a vehicle in which the mobile device is located has entered into a parked state. GPS or other primary location technology may be unavailable at the time the mobile device entered into a parked state (e.g., inside a parking structure). The location of the mobile device at a time corresponding to when the vehicle is identified as being parked can be determined using the first location technology as supplemented with sensor data of the mobile device. After the location of the mobile device at a time corresponding to when the vehicle is identified as being parked is determined, the determined location can be associated with an identifier for the current parking location.

(73) Assignee: **Apple Inc.**, Cupertino, CA (US)(21) Appl. No.: **13/773,546**(22) Filed: **Feb. 21, 2013****Publication Classification**(51) **Int. Cl.****G08G 1/123**

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